

SAFETY PRODUCTS

LineStrong 1

Rope Pull Emergency Stop

Data Sheet

LineStrong is a rope pull emergency stop switch, used for easy reach of the emergency stop function along machines and sections of conveyors.

A rope pull emergency stop switch allows to initiate the emergency stop command from any point along the installed wire length by pulling the wire. It replaces a series of emergency stop buttons and is easier to install.



Easy to Install

Quick Installation

A rope pull emergency stop switch is easier to install than a system of several emergency stop buttons along a carriage path.

Variety of accessories

Quick link rope system makes installation of rope easy. Different pulleys allow for easier installation.



Continuous operation

Reliable in extreme conditions

Robust construction makes LineStrong ideal for use in demanding environments.

LED diagnostics

Integrated LED diagnostics ensures status can be seen easily from a distance.



Safety and Protection

Easily accessible

Easy reach of the emergency stop function along machines, conveyors and processes.

High level of safety

The positive forced disconnect contacts provide a high level of safety and are double switching, i.e. triggers emergency stop in both directions of the wire.

Ordering Information

Description	Material Housing	Order code
Linestrong 1, ½ NPT, 2NC/2NO	Die Cast	2TLA050200R1030
Linestrong 1, ½ NPT, 2NC/2NO, Estop	Die Cast	2TLA050200R1130
Linestrong 1, ½ NPT, 2NC/2NO, 24VDC LED	Die Cast	2TLA050200R1232
Linestrong 1, ½ NPT, 2NC/2NO, 110VAC LED	Die Cast	2TLA050200R1233
Linestrong 1, ½ NPT, 2NC/2NO, 230VAC LED	Die Cast	2TLA050200R1234
Linestrong 1, ½ NPT, 2NC/2NO, Estop, 24VDC LED	Die Cast	2TLA050200R1332
Linestrong 1, ½ NPT, 2NC/2NO, Estop, 110VAC LED	Die Cast	2TLA050200R1333
Linestrong 1, ½ NPT, 2NC/2NO, Estop, 230VAC LED	Die Cast	2TLA050200R1334

Accessories

Description	Material Housing	Order code
½ NPT Cable Gland	Stainless Steel	2TLA050040R0001
5M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0030
10M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0130
15M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0230
20M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0330
30M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0430
50M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0530
80M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0630
100M Rope Kit, Galvanized. with Allen Key	Galvanized Steel	2TLA050210R0730
126M Rope Kit, Galvanized with Allen Key	Galvanized Steel	2TLA050210R0830
Rope Tensioner, Galvanized	Galvanized Steel	2TLA050210R4030
Eyebolt M8x1.25, Galvanized	Galvanized Steel	2TLA050210R8030
Pully, Galvanized	Galvanized Steel	2TLA050210R6030
LED Green/Red 24 VDC	Galvanized Steel	2TLA050211R0001
LED Green/Red 110 VAC	Galvanized Steel	2TLA050211R0002
LED Green/Red 230VAC	Galvanized Steel	2TLA050211R0003
Safety Spring. 220mm long	Stainless Steel	2TLA050211R0004
E-Stop Button	Galvanized Steel	2TLA050211R0005
Anti-Tamper, Torx T20	Galvanized Steel	2TLA050211R0006
Flexible Roller with Adjustment	Stainless Steel	2TLA858006R1300

Additional information can be found in the [Linestrong Product Manual](#).

Technical Data

Manufacturer	
Address	ABB Electrification Sweden AB / JOKAB SAFETY Varlabergsvägen 11 SE-434 39 Kungsbacka Sweden
Electrical characteristics	
Contact type	IEC/EN60947-5-1 double break typ Zb
Contact material	Silver
Termination	Clamp up to 2,5 mm ² Conductors
Utilization category	AC15 A300 3A 240VAC 3A/120VAC 6A/24VDC 2.5A inductive
Thermal current (I _{th})	10A
Rated insulation/withstand voltages	500 VAC/2500 VAC
Short circuit overload protection	Fuse externally 10 A (FF)
General	
Wire span	Up to 50 m
Wire tension devise	ABB Jokab Safety Wire Tensioner
Wire type	PVC sheath steel wire 4.0 mm outside diameter
Torque settings	Mounting M5 4.0Nm Lid T20 Torx M4 1.5Nm Terminals 1.0Nm
Tension force (typical mid setting)	130 N
Tension operating force (wire pulled)	< 125N < 300 mm deflection
Vibration resistance	10-500 Hz 0.35 mm
Shock resistance	15 g 11 ms
Conduit entries	3 x ½ NPT
Enclosure classification	IP67
Ambient temperature	-25...+80°C
Size	See manual
Material	Die cast painted yellow
Size	See manual
Mounting Positions	Any
Mounting Bolts	4 x M5
Weight	0.675kg
Safety-related characteristic data and Conformity	
Conformity	European Machinery Directive 2006/42/EC EN ISO 12100:2010, EN ISO 13850:2008, EN 60204-1:2006+A1:2009 EN 60947-1:2007+A1:2011, EN 60947-5-1:2004+A1:2009, EN 60947-5-5:1997+A1:2005
EN ISO 13849-1	Up to PL e, Cat. 4 depending on system architecture
EN 62061	Up to SIL3 depending on system architecture
Safety data	
Mechanical reliability B10d	1.5 x 10 ⁶ operations at 100mA load
PFHD	<1.0 x 10 ⁻⁷
Proof test interval (life)	21 years
MTTFd	214 years (8 cycles per hour/24 hours per day/365 days per year)
Certifications	TÜV, cULus
Information with regard to UL 508	Use 12AWG copper conductors only Electrical Rating: A300 48W5 Type 1 Enclosure Max. Switching Current / Volt / Amp: 120V 6A (720VA break) PF 0.38, 240V 3A (720VA break) PF 0.38

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products/machine-motor-control

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